

Elaine McCluskey

From: Elaine McCluskey [mccluskey@fnal.gov]
Sent: Monday, November 08, 2004 8:36 AM
To: Bill Foster; Chuck Federowicz; David Finley; David Harding ; Dixon Bogert; Duane Plant; Ed Crumpley; 'Erene Noyola'; fgarcia@fnal.gov; Rich Stanek; Shekar Mishra; 'Steve Geer'; Tom Lackowski; Vic Kuchler; Weiren Chou
Subject: Notes from 11/03/04 Linac Proton Driver Meeting - Civil

NEXT MEETING WILL BE 11/10/04 IN conFESSional AT 9:30 A.M.

Attendees: Fernanda Garcia, Bill Foster, Duane Plant, Dixon Bogert, Chuck Federowicz, Rod Walton, Dave Finley, Vic Kuchler, Rich Stanek, Weiren Chou, Elaine McCluskey

Items discussed:

1. Updated alignment not so far to the south, with one arc, one straight, one arc
 - a. Clear for linac dump (straight-ahead dump at end of linac)
 - b. Straight length of about 730 ft good for crossing AP and MR beam lines, along with ponds and roads
 - c. May need additional straight section between arc and linac of about 144m for collimation – Weiren will let Chuck know what distance should be
 - d. Transition from linac-sized wider enclosure to narrower transport line enclosure will be at the end of the linac itself
 - e. Question of whether beam design has changed, as Chuck found some points from latest information from Weiren different from those previously given up near injection area. Weiren agreed could be small variation. Concluded need to verify magnet layouts to allow for mechanical adjustments – Bills said to use MR spacing as a guide.
 - f. Agreed restaking of beamline will be done when alignment is finalized.
 - g. Need to revise beamline shown in civil cross-sections to be on other side of Linac tunnel, so that Linac dump doesn't cross beam line.
2. Site Plan – Revised to reflect current plan.
 - a. Shows are within 300m of jurisdictional wetlands. Rod says not to get concerned about this. Just means will need wetland permit and some mitigation. Should be easier with other wet areas nearby.
 - b. Could bring Utility Corridor extension utilities (DWS, ICW) via directional bore instead of along road. Will review optimum routing.
 - c. Discussed site drainage perpendicular to Linac. Explained that culvert pipes could be placed to drain site, along with ditches. This will be outcome of civil site design.
3. Dumps
 - a. Linac – question of elevation. Leave at MI elevation, not lower. Length of drift required from linac to dump needs to be understood
4. Civil drawings – reviewed planned drawings for incorporation into report. Will be very similar to 8 GeV Linac Study report drawings, with criteria drawing included and some enlarged plans at Injection Dump, Injection point MI10, Beamline crossings and Linac Dump.

ITEMS FOR NEXT WEEK:

Site plan with added straight section between linac and first arc.
 Possible restaking of beamline after next meeting if alignment is accepted.

ACTION ITEMS:

Chuck will include new straight section. We are still looking for the translation from optics to feet and DUSAF coordinates that may be able to happen with Dave Johnson translation. Weiren to investigate this.

NEXT MEETING WILL BE 11/10/04 IN conFESSional AT 9:30 A.M.

Elaine McCluskey
 Fermi National Accelerator Laboratory
 FESS Engineering

(630) 840-2193
mccluskey@fnal.gov